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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/023,440

12/14/2001

Michael S. Zaharkin

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10/05/2006

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EXAMINER

BASHORE, WILLIAM L

ART UNIT

PAPER NUMBER

2176

DATE MAILED: 10/05/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/023,440

Applicant(s)

ZAHARKIN

Examiner

William L. Bashore

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 13 July 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-23,29,31 and 33-35 is/are pending in the application.
- 4a) Of the above claim(s) 11,12,16-23,29,31 and 35 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-10,13-15,33 and 34 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 7/13/2006.

- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION

1. This action is responsive to communications: amendment/remarks filed 7/13/2006, to the original application filed 12/14/2001, PCT date 6/14/2000, provisional filing date of 6/14/1999. IDS filed 12/11/2001, 4/30/2002, and 3/22/2004 (enclosed herewith). Regarding IDS filed 12/11/2001, the examiner cannot find a copy of the Hunter reference (NPL) in the record. Applicant is respectfully requested to resubmit said Hunter reference with next correspondence.
2. Claims 1-23, 29, 31, 33-35 pending. Claims 11-12, 16-23, 29, 31, 35 remain withdrawn from consideration. Claims 1-10, 13-15, 33-34 remain selected for examination of the merits. Claims 1, 9, 13, 14, 33, 34 are independent claims.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claim 34 is rejected under 35 U.S.C. 102(e) as being anticipated by Wanderski et al. (hereinafter Wanderski), U.S. Patent No. 6,519,617 issued February 2003.

In regard to independent claim 34, Wanderski discloses transformation (using software) for converting an XML document with DTD into a new transformed document reflective of an XML dialect (Wanderski column 4 lines 25-42). A plurality of DTDs are generated, as needed, so that a document (an output file) will conform to its new DTD accordingly (Wanderski column 11, lines 60-67). In this fashion, various documents are “disambiguated” via compliance with their respective (different) DTDs, changing all, or portions of documents as necessary.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1-10, 13-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wanderski et al. (hereinafter Wanderski), U.S. Patent No. 6,519,617 issued February 2003.

In regard to independent claim 1, Wanderski teaches creation of an XML “dialect” using dynamically selected transformations, comprising receiving a document (i.e. XML) and a DTD (Wanderski Abstract, column 4 lines 25-43). The XML document is parsed into a DOM tree of nodes which serves to map nodes to said XML document (Wanderski column 9 lines 9-12, column 7 lines 49-67). The DOM tree reflects a candidate path from node to node.

Wanderski alters (disambiguates) the DOM nodes accordingly (Wanderski column 11 lines 5-48). A new DTD is dynamically generated corresponding to the modified nodes of the DOM tree (Wanderski column

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11 lines 59-67), therefore a new dialect of an XML document is created, so that when the new XML document is re-created, the new document is generated based upon instructions by the new DTD.

Wanderski does not specifically teach selection based upon “scoring” of candidate paths. However, Wanderski teaches redundancy reduction and default attribute values comprising reducing redundant nodes of a DOM tree, as well as keeping count of the number of times a value occurs, so as to determine a “default” value (Wanderski column 13 lines 44-53, column 14 lines 4-11). Since these methods of DOM alteration incorporate a form of tallying for statistical purposes, it would have been obvious to one of ordinary skill in the art at the time of the invention for the skilled artisan to keep score of the nodes (as explained above) so as to provide the benefit of streamlining the DOM tree for a more compact document.

In regard to dependent claims 2-3, Wanderski teaches a DTD further modifying an XML document (Wanderski column 7 lines 60-65, column 4 lines 34-39).

In regard to dependent claims 4-8, Wanderski does not specifically teach selection based upon “scoring” of candidate paths. However, Wanderski teaches redundancy reduction and default attribute values comprising reducing redundant nodes of a DOM tree, as well as keeping count of the number of times a value occurs, so as to determine a “default” value (Wanderski column 13 lines 44-53, column 14 lines 4-11). Since these methods of DOM alteration incorporate a form of tallying for statistical purposes, it would have been obvious to one of ordinary skill in the art at the time of the invention for the skilled artisan to keep score of the nodes (as explained above) so as to provide the benefit of streamlining the DOM tree for a more compact document.

In regard to independent claim 9, claim 9 incorporates substantially similar subject matter as claimed in claim 1, and is rejected along the same rationale.

In regard to dependent claim 10, Wanderski alters (disambiguates) the DOM nodes accordingly (Wanderski column 11 lines 5-48). A new DTD is dynamically generated corresponding to the modified nodes of the DOM tree (Wanderski column 11 lines 59-67), therefore a new dialect of an XML document is created, so that when the new XML document is re-created, the new document is generated based upon instructions by the new DTD.

Wanderski does not specifically teach selection based upon “scoring” of candidate paths. However, Wanderski teaches redundancy reduction and default attribute values comprising reducing redundant nodes of a DOM tree, as well as keeping count of the number of times a value occurs, so as to determine a “default” value (Wanderski column 13 lines 44-53, column 14 lines 4-11). Since these methods of DOM alteration incorporate a form of tallying for statistical purposes, it would have been obvious to one of ordinary skill in the art at the time of the invention for the skilled artisan to keep score of the nodes (as explained above) so as to provide the benefit of streamlining the DOM tree for a more compact document.

In regard to independent claim 13, claim 13 reflects the computer program product comprising computer readable instructions used for performing the methods as claimed in claim 1, and is rejected along the same rationale.

In regard to independent claim 14, claim 14 reflects the system comprising computer readable instructions used for performing the methods as claimed in claim 1, and is rejected along the same rationale.

In regard to dependent claim 15, Wanderski teaches a workstation (Wanderski Figure 1, column 5 lines 30-49, column 6 lines 10-21).

7. **Claim 33 is rejected under 35 U.S.C. 103(a) as being unpatentable over Wanderski, in view of Yamakawa et al. (hereinafter Yamakawa), U.S. Patent No. 5,907,851 issued May 1999.**

In regard to independent claim 33, Wanderski discloses transformation (using software) for converting an XML document with DTD into a new transformed document reflective of an XML dialect (Wanderski column 4 lines 25-42). A plurality of DTDs are generated, as needed, so that a document (an output file) will conform to its new DTD accordingly (Wanderski column 11, lines 60-67). In this fashion, various documents are “disambiguated” via compliance with their respective (different) DTDs, changing all, or portions of documents as necessary.

Wanderski does not specifically teach providing a set of two or more DTDs, and selecting one for conversion. However, Yamakawa teaches document conversion utilizing preparation of a plurality of document type definitions (DTDs) for switching and development of one or more DTDs (Yamakawa column 22 lines 22-32, Figure 67). It would have been obvious to one of ordinary skill in the art at the time of the invention to apply Yamakawa to Wanderski, providing Wanderski the benefit of predefined DTD selection for eventual adherence to various established standards.

Response to Arguments

8. Applicant's arguments filed 7/13/2006 have been fully and carefully considered but they are not persuasive.

Applicant argues on page 11 of the amendment that the cited art does not teach instant claim 34. The examiner respectfully disagrees. One object of Wanderski is to modify an existing XML document (with an XML DTD) into another XML variation (or dialect). It is within reason that an XML document can contain at least two portions. In addition, it is also within reason that a transformation may not require modification of all portions of a document. Since an XML DTD variant, and a base XML DTD (i.e. the original document) can contain some common base definition rules, it is well within reason that the new DTD would only act to modify

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portions not already in conformance with said variant DTD. Since the unaffected document portions need no modification, they are merely copied to the new document accordingly.

Applicant argues on page 11-12 of the amendment that Wanderski does not teach “selection based upon scoring of candidate paths”. The examiner respectfully disagrees. Wanderski teaches redundancy reduction and default attribute values comprising reducing redundant nodes of a DOM tree, as well as keeping count of the number of times a value occurs, so as to determine a “default” value. The examiner respectfully maintains his position that since these methods of DOM alteration incorporate a form of tallying for statistical purposes, it would have been obvious to one of ordinary skill in the art at the time of the invention for the skilled artisan to keep score of the nodes (as explained above) so as to provide the benefit of streamlining the DOM tree for a more compact document. It is the examiner’s opinion that altering/reducing redundant nodes of a DOM tree involves selection of paths (i.e. paths containing relevant nodes, etc.), the selection at least associated with tallying (scoring).

Applicant argues on page 12 (at bottom) of the amendment that the cited art of record does not teach instant claim 9 and 10. The examiner respectfully disagrees. It is respectfully submitted that if not inherent, then it is at least obvious that a DOM tree can be reasonably interpreted as a form of mapping file from a document to its DTD.

Applicant argues on page 13 of the amendment that the cited art does not teach instant claim 33. The examiner respectfully disagrees. It is within reason that if a particular DTD dialect is already popular and extensively used, it is at least obvious that Wanderski can use a custom ready DTD instead of generating its own.

Conclusion

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).


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A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to William L. Bashore whose telephone number is (571) 272-4088. The examiner can normally be reached on 11:30am - 8:00pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Heather Herndon can be reached on (571) 272-4136. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

11. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


WILLIAM BASHORE
PRIMARY EXAMINER

September 30, 2006